

Meson Cryomodule Test Area

Cryogenic Status

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Outline

- Cryogenic scope
- System overview and status
- Plans and schedule
- Cost

Cryogenic Scope

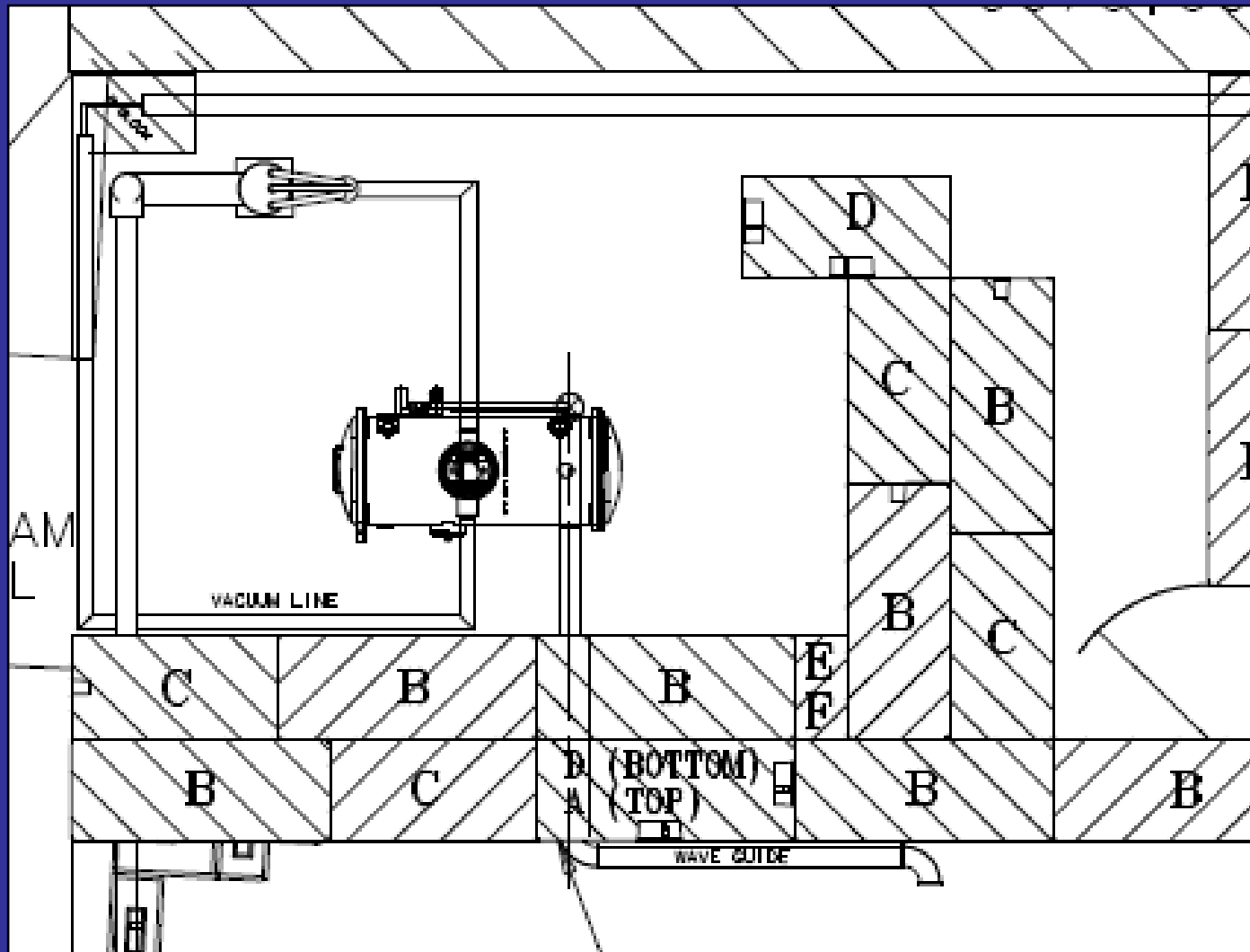
- Design, install, commission and operate cryogenic system to support 2K operation of horizontal test cryostat
- Assumed system features:

Nominal temperature levels	2K, 5K, 80K
Ease of operation	Quick warm-up / cool down
Test plans and schedule	Two tests per month
One MDB test area cold at a time	

MDB Cryogenics



Cryogenic Scope



Cryogenic Status

- Cryogenic transfer line (50% complete)
- Gas headers (50% complete)
- Vacuum pump system (40% complete)
- Module cryogenic distribution system (20% complete)
- Quick warm-up & cooldown system (10% complete)
- Cryogenic controls and instrumentation (60% complete)
- ODH system (0% complete)

Plans and Schedule

- Cryogenic transfer line - installation Jan. 06
- Gas headers – installed Dec. 05
- Vacuum pump system – installed Jan. 06
- Module cryogenic distribution system – Jan. 06
- Quick warm-up & cooldown system – April 06
- Cryogenic controls – Feb. 06
- ODH system – Feb. 06

Cost

- Cryogenic Infrastructure
(outside project scope)

	Budget	YTD	Balance
– M&S FY06	\$245k	\$51k	\$194k

- Operation (FY 06 – FY 07)
 - 6 cavities x 1 horizontal tests/cavity (optimistic)
8 cavities x 2 horizontal tests/cavity (pessimistic)
 - Manpower 0.2 - 0.5 FTE
 - M&S \$28k - \$75k (nitrogen and helium)